

are often chosen which offer a greater capacity than actually necessary. These excess capacities prevent the systems from running in an ecologically optimal manner [BMBF, 1998; STRIEGEL, HOFFMANN, KREISEL and GRÜN, 1999].

Although the analysis refers to alternative technologies of industrial metal cleaning, we think the introduced approach can be used for comparative LCAs of other processes as well.

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Books

Life Cycle Assesment in Industry and Business: Adoption Patterns, Applications and Implications

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The challenge of our time is the greening of products. Different tools and concepts to support this process have been developed in the past decade. Among others, Life Cycle Assessment (LCA) appears as one of the most instructive management instruments for gaining insight into product-related environmental impacts and for supporting an effective integration of environmental aspects in business and economy.

Research on LCA was and still is focused on improving the methodology. In fact, the "LCA-technique" has significantly improved over the last few years. However, this research progress did nearly not stress the application context of LCA and its embodiment into business and industry. This is precisely the primary focus of the present book. Basing on the empirical information of a large survey and of twenty company case-studies, the book describes the set of applications and uses, as well as the dynamics of the adoption and integration patterns of LCA within business and industry.

The resulting implications for research, business and environmental policy are also discussed.

Contents:

Introduction; Life Cycle Assessment; Objectives and Scope; Outline. – Framework and Theoretical Background. – Application of LCA in General; Methods; General Application; Years, Commissioning Bodies; Business as Clients; Subjects; Conclusions. – A 'Static' Perspective on LCA Applications – Survey Results; Method; Sample and Evaluation Procedure; Results; Conclusions. – The Dynamics of LCA Adoption and Integration in the Firm – The Results of the Case Studies; Introduction; Summary Reports of Selected Case Studies; Overview on Application Patterns; Conclusions. – The Relationship Between Business and Policy: Expectations and Implications; Business View on Policy; Policy View on Business; Conclusions. – Conclusions and Recommendations; Summarising Results; Interesting Results; Recommendations